

ABSTRACT

5 A process for producing lipids containing  
arachidonic acid comprising culturing a microorganism in  
which  $\omega$ 3 desaturase activity has been decreased or is  
lacking at a temperature lower than the optimum growth  
temperature from the start of culturing or after  
culturing at the optimum growth temperature, said  
microorganism being obtained by the mutation treatment of  
10 a microorganism capable of producing arachidonic acid and  
belonging to the genus Mortierella and the like; and then  
recovering lipids containing arachidonic acid from the  
culture.